

CLAIMS:

1. A recording device (1) for recording audio data (AD) and selected associated video data (SVD) of a television broadcast in a frame recording mode, the device comprising receiving means (8) for receiving audio data (AD) and associated video data (VD), in which the received video data (VD) comprise, inter alia, intraframe-encoded information of frames of the television broadcast and time-stamp information, which time-stamp information characterizes the instants of occurrence of the frames in the television broadcast, and selection means (14) for selecting the video data (VD) comprising the frame information and associated time-stamp information from the received video data (VD), and selection means (15) for selecting at least one and maximally N of the frames selected during a partial broadcast period (TD), which partial broadcast period (TD) corresponds to a part of the overall broadcast period (SD) of the television broadcast, and recording means (9) for recording the overall received audio data (AD) and the selected video data (SVD) comprising the information of the selected frames and associated time-stamp information on a record carrier (11).

2. A recording device (1) as claimed in claim 1, wherein black-frame detection means (17) for detecting a black frame in the received video data (VD) characterizing a change of scenes in the television broadcast are provided, and wherein the selection means (15) are adapted to select each selected frame which occurs after a black frame detected by the black-frame detection means (17).

3. A recording device (1) as claimed in claim 1, wherein frame comparison means (18) are provided which are adapted to compare characteristic features of consecutive selected frames and, as a result of the comparison, to supply a change value (VW), and wherein the selection means (15) are adapted to select a selected frame when the change value (VW) exceeds a change threshold value from the previously selected frame to this selected frame.

4. A recording device (1) as claimed in claim 1, wherein start-detection means (16) are provided which are adapted to detect the start of each television broadcast received in the received video data (VD), and wherein the selection means (15) are adapted to select the first selected frame of each television broadcast.

5. A recording device (1) as claimed in claim 1, wherein the selection means (15) are adapted to select at least one and maximally $N = 5$ of the selected frames during the partial broadcast period (TD) of one minute.

6. A recording device (1) as claimed in claim 1, wherein the receiving means (8) are adapted to receive audio data (AD) and video data (VD) encoded in accordance with the MPEG-2 standard (ISO/IEC 13818), and wherein the frames are constituted by I frames (I) of a Group of Pictures (GOP).

7. A reproducing device (1) for reproducing audio data (AD) and video data (VD) in a frame recording mode, recorded on a record carrier (11) by means of a recording device (1) as claimed in claim 1 in a frame recording mode of the recording device (1), the device comprising
reproducing means (9) for reproducing the audio data (AD) and video data (VD) recorded on the record carrier (11), wherein the reproduced video data (VD) are formed by intraframe-encoded information of frames of a television broadcast and by time-stamp information, which time-stamp information characterizes the instant of occurrence of the frames in the television broadcast, and
supply means (12) for continuously supplying the reproduced audio data (WAD) and for time-limited supplying the reproduced information of a frame during a frame reproducing period, in which the start of the frame reproducing period is characterized by the time-stamp information assigned to the reproduced frame, and in which the end of the frame reproducing period is characterized by the time-stamp information assigned to the frame to be subsequently reproduced.

8. A reproducing device (1) as claimed in claim 7, wherein the reproducing means (9) are adapted to reproduce I frames (I) of a Group of Pictures (GOP) corresponding to the MPEG-2 standard (ISO/IEC 13818) as intraframe-encoded frame information.

9. A method of recording audio data (AD) and selected associated video data (SVD) of a television broadcast in a frame recording mode, the method comprising the steps of
- receiving audio data (AD) and associated video data (VD), wherein the received video data (VD) comprise, inter alia, intraframe-encoded information of frames of the television broadcast and time-stamp information, which time-stamp information characterizes the instants of occurrence of the frames in the television broadcast,
 - selecting the video data (VD) comprising the frame information and associated time-stamp information from the received video data (VD),
 - selecting at least one and maximally N of the frames selected during a partial broadcast period (TD), which partial broadcast period (TD) corresponds to a part of the overall broadcast period (SD) of the television broadcast,
 - recording the overall received audio data (AD) and the selected video data (SVD) comprising the frame information of the selected frames and associated time-stamp information on a record carrier (11).
10. A recording method as claimed in claim 9, comprising the further steps of
- detecting a black frame in the received video data (VD) characterizing a change of scenes in the television broadcast,
 - selecting each selected frame occurring after a detected black frame.
11. A recording method as claimed in claim 9, comprising the further steps of
- comparing characteristic features of consecutive selected frames and supplying a change value (VW) as a result of the comparison,
 - selecting a selected frame when the change value (VW) exceeds a change threshold value from the previously selected frame to this selected frame.